### MANAGEMENT UNIT 11A (15) - ANTHRO/RANGE CREEK, ANTHRO

## **Boundary Description**

**Duchesne and Uintah counties** - Boundary begins at Duchesne and Highway US-191; then southwest on US-191 to the Argyle Canyon Road; southeast on this road to the Nine Mile Canyon Road; east along this road to it's end near Bulls Canyon; south from the end of the road to Nine Mile Creek; east along this creek to the Green River; north along this river to the Duchesne River; northwest along this river to Highway US-40; west on US-40 to Duchesne and beginning point (excludes all Ute Indian Tribal lands within this boundary).

### **Management Unit Description**

The 1996 Utah Big Game Annual Report identifies 639,228 acres of land within management unit 11A. The Bureau of Land Management is responsible for 43% of the land area, with U.S. Forest Service and State of Utah lands making up an additional 16% and 5% of the land area respectively. Indian and private lands make up one-third of the land area at 14% and 21% respectively. There is a long and gradual northerly slope to the Anthro Mountain terrain, which lends itself to an abundance of winter range. The long slopes are covered by pinyon-juniper woodland with natural openings of sagebrush. Grassy openings are often found in the drainages. Some ridge tops are covered with black sagebrush. Summer range is limited with most of the high country being comprised of open sagebrush slopes with scattered patches of aspen. Most of the winter range in the unit is available even in severe winters. The upper limits for winter range are generally considered between 8,000 and 8,500 feet. The desert country below 4,000 feet is seldom used by migrating deer.

### **Livestock Grazing**

Cattle grazing is the major activity occurring on Forest Service managed lands within management unit 11A. Oil and gas exploration and drilling with their associated roads and year-round activity are the prominent activities taking place on the lower ends of the ridges. These lands are administered by the BLM and Ute Indians. Firewood cutting is also an important use on the Ute Indian lands.

Information on the current livestock grazing program was provided by the Ashley National Forest. The Cottonwood allotment, where study 11A-1 is located, is a 2-unit deferred rotation system with 326 head of cattle from June 16 to October 15. Prior to 1981, the allotment was generally grazed season long. Study 11A-2 is in the Anthro Mountain allotment and is currently grazed by 481 head of cattle under a 7- unit rest-rotation system from June 1 to October 15. The Antelope Winter allotment, where study 11A-3 is located, is a 3-unit deferred rotation system with 200 head of cattle grazing the allotment from December 1 to March 23.

## Big Game Management Objectives

A small, but increasing number of elk constitute the Anthro herd. It has been hunted under a bull only permit system since 1978, but was separated from the larger Avintaquin-White River herd unit in 1983. The elk herd is currently (1996) managed as a limited entry hunting area with an emphasis on quality hunting by maintaining low hunter numbers and a high percentage of mature bulls in the population. The high for bull permits came in 1990 with 22 permits allowed. In 1995, only 7 bull permits were allowed, compared to 13-15 permits allowed between 1991 and 1994. Eleven permits were available in 1997, and 13 in 1998. Hunter success is usually high. Current elk herd management objectives call for a target winter herd size of 700 animals with a minimum post season bull to cow ratio of 8:100, with at least 4 bulls being 2 ½ years of age or older.

Deer numbers on the Anthro Mountain unit continue to be relatively low. Buck harvest averaged 161/year from 1979 to 1983 and then doubled to an average annual harvest of 387 bucks from 1984 to 1988. From 1989 to 1991, buck harvest numbers steadily declined from a high of 579 in 1988 to 237 in 1991. Since 1991, buck harvest numbers have stayed fairly constant with an average of 154/year. Success has remained fairly constant over all years at around 33%. The current deer herd unit plan calls for a target wintering herd of 2,500 animals with an annual harvest of 250 bucks.

Unfortunately, the pellet transects are no longer maintained so deer days use per hectare estimates for key areas are unavailable.

Pronghorn are also present in the study area. They have been observed on Myton Bench and on the pinyon-juniper and sagebrush ridges of Lower Cottonwood and Antelope Canyons. Buck hunting was first permitted in 1978.

# Study Site Description

The Upper Cottonwood Ridge (11A-1) study samples an aspen type at 9,200 feet, while the Wirefence Canyon (11A-2) and Chokecherry Canyon (11A-3) studies are located in the predominant sagebrush/grass type. These studies were established in late September of 1982, then re-read in late July 1988. Two additional studies were established in early August 1988, which sample representative winter range for the area. The Cottonwood Canyon (11A-4) study is on DWR land, while the Nutters Canyon (11A-5) study is apparently on the Uintah and Ouray Indian Reservation (it was originally thought to be on BLM). They are both located in naturally open sagebrush valleys surrounded by pinyon-juniper woodland. All sites were reread in 1995 and 2000, with the exception of study number 11A-1 which was not read in 2000.

#### **SUMMARY**

#### WILDLIFE MANAGEMENT UNIT 11A (OLD 15)

Summer range on this unit is sampled by two sites, Wirefence Canyon (11A-2) and Chokecherry Canyon (11A-3). Upper Cottonwood Ridge (11A-1) also samples summer range, but was not read in 2000. Wirefence Canyon and Chokecherry Canyon both sample high elevation mountain big sagebrush areas. Cottonwood Canyon (11A-4) and Nutters Canyon (11A-5) sample winter ranges within the unit.

Due to drought conditions in 2000, a majority of the sites show downward browse and herbaceous understory trends. Browse trends are down or slightly down due to increases in poor vigor and decadency. Herbaceous understory trends are down or slightly down due to a decrease in sum of nested frequency of perennial species. With normal precipitation in the future, these trends will most likely improve.

In summary, although pinyon and juniper stands dominate much of the winter range, there are sufficient natural openings to provide good quality winter range. There are pinyon-juniper sites with the potential after treatment, to provide more forage during the fall-spring period. The summer range remains the limiting factor, especially for deer.

**Trend Summary** 

	Category	1982	1988	1995	2000
11A-1 Upper Cottonwood Ridge	soil	est	3	3	NR
	browse	est	3	3	NR
	herbaceous understory	est	5	5	NR
11A-2 Wirefence Canyon	soil	est	3	3	3
	browse	est	3	3	2
	herbaceous understory	est	3	4	2
11A-3 Chokecherry Canyon	soil	est	3	3	3
	browse	est	4	4	4
	herbaceous understory	est	5	3	2
11A-4 Cottonwood Canyon	soil		est	3	2
	browse		est	3	1
	herbaceous understory		est	3	3
11A-5 Nutters Canyon	soil		est	3	3
	browse		est	3	2
	herbaceous understory		est	2	2

 $<sup>\</sup>overline{(1)} = \text{down}, (2), \text{ slightly down}, (3) = \text{stable}, (4) = \text{slightly up}, (5) = \text{up}$